Examiner Kriellon Sanders
United States Department of Commerce

US Patent and Trademark Office

Docket No. 2934-0103P

OCT 2 2 2003

TC 1700

Control No. 09/820,916

Dear Examiner Sanders:

I hope for your understanding ---- I'm the inventor, not an attorney. I'm responding to the case because of financial reasons. I would have an attorney if I could afford it, but I can't.

Referring to page 2 of your review, you ask for a restriction.

I choose **option I**. "Claims 1-42 and 70-76, 95, and 96, drawn to a compostable and degradable polymer composition, classified in class 524, subclass 47".

I believe the only other task is to make a selection of one component from each of A, B, and D.

- A. polyesteramide -- I elect item v) on page 124 (copy of page enclosed)
- B. I elect starch derivatized with ethyleneimine, as shown on page 123 (copy enclosed)
- C. Crosslinker --- 3-(trimethoxysilyl)-1-propanamine

Norman Holy October 15, 2003

Morwen Holy

## Claims:

- 1 1. A compostable and/or degradable polymer
- 2 composition, comprising:
- 3 polymer (A) which is a polyesteramide copolymer;
- 4 polymer (B) which is at least one polymer selected from
- 5 the group consisting of polyethylenevinyl alcohol, polyvinyl
- 6 alcohol, polyester, starch, starch derivative, cellulose,
- 7 polyethylene glycol, chitin, amylose, amylopectin, starch
- 8 derivatized with ethyleneimine cellulose derivatized with
- 9 ethyleneimine, polysaccharides derivatized with
- 10 ethyleneimine, lignin derivatized with ethyleneimine,
- 11 farinaceous materials derivatized with ethyleneimine and
- 12 mixtures thereof;
- component (C) which is a plasticizer; and
- 14 component (D) which is a crosslinking agent;
- wherein the polymer composition comprises 0 to 60 wt?
- 16 of polymer (B), 0 to 25 wt% of component (C), and 0 to 5 wt%
- 17 of component (D);
- wherein all wt% values are based upon the total weight
- 19 of the polymer composition; and
- 20 with the proviso that the polymer composition must
- 21 contain at least one of polymer (B) and component (D).
- 1 2. The compostable and/or degradable polymer
- 2 composition according to claim 1, wherein the amide content
- 3 is 80 to 20 wt% of the polyesteramide copolymer.
- 1 3. The compostable and/or degradable polymer
- 2 composition according to claim 1, wherein the ester content
- 3 is 20 to 80 wt% of the polyesteramide copolymer.

polyamide; and

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1 The compostable and/or degradable polymer composition according to claim 1, wherein polymer (A) is 2 prepared from at least one of the following sets of 3 reactants: i) cyclic amide; dicarboxylic acid or ester and 5 aliphatic diol; 6 7 ii) aliphatic polyamide and a cyclic ester, a diol 8 or both; . iii) aliphatic diamine, dicarboxylic acid or ester 9 and aliphatic diol; Ï1 iv) cyclic amide, dicarboxylic acid or ester, 12 tricarbox lic acid or ester; and aliphatic diol; v) Eyclic amide and cyclic ester; 13 vi) aminocarboxylic acid, dicarboxylic acid or 14 ester and aliphatic diol; 15 16 vii) aliphatic diamine and/or triamine, aliphatic 17 diol, dicarboxylic acid or ester and cyclic amide; viii) aliphatic polyamide and polyester; 18 19 ix) polymerized vegetable oil and polyester, 20 aliphatic diol or both; x) aliphatic diamine and aliphatic diol; 21 xi) cyclic amide, aminocarboxylic acid, 22 -23 hydroxycarboxylic acid; 24 xii) cyclic amide and hydroxycarboxylic acid; xiii) aliphatic polyamide and hydroxycarboxylic 25 26 acid; 27 xiv) cyclic amide, cyclic ester, dicarboxylic acid or ester and aliphatic diol; 28 triol/diol/aliphatic dicarboxylic 29 crosspolymer and a 30

- 3 is selected from the group consisting of ammonium
- 4 polyphosphate and zinc pyrophosphate.
- 1 29. The compostable and/or degradable polymer
- 2 composition according to claim 27, wherein the degrading aid
- 3 is in a range of 0.1 5 wt%.
- 1 30. The compostable and/or degradable polymer
- 2 composition according to claim 1, further comprising
- 3 component (D) which is a crosslinking agent.
- 1 31: The compostable and/or degradable polymer composition
- 2 according to claim 30, wherein the crosslinking agent is
- 3 selected from the group/consisting of a triamine, triol,
- 4 jeffamine, polyethyleneimine, multifunctional amines,
- 5 glycerol, sorbitol, EVOH, PVOH, triaminopyrimidines,
- 6 tetraazacyclo-tetradecane, tricarboxylic acid or ester,
- 7 tetracarboxylic acid or ester, methylene bis(4-phenyl
- 8 isocyanate), vinyltrimethoxysilane, diethylene glycol
- 9 diglycidyl ether, epichlorohydrin,
- 10 1,1,3,3,5,5,7,7,9,9,11,11-dodecamethyl-1,11-bis(4-
- 11 (oxiranylmethoxy)phenyl)-Hexasiloxane, (3-(trimethoxysilyl)-
- 12 1-Propanamine zinc pyrophosphate, zinc oxide and mixtures
- 13 thereof.
- 1 32. The compostable and/or degradable polymer
- 2 composition according to claim 30, wherein the crosslinking
- 3 agent is selected from the group consisting of
- 4 3,3-dimethoxy-7,9-dimethyl-7-((nonamethyltetra-
- 5 siloxanyl)oxy))-9-((trimethylsilyl)oxy)-2,8,13-trioxa-3,7,9-
- 6 trisilapentadecan-15-ol;
- 7 1,1,1,3,3,5,5,7,7,9,11,13,15,17,19,19,